

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
24 June 2004 (24.06.2004)

PCT

(10) International Publication Number
WO 2004/053992 A3

(51) International Patent Classification⁷: **H01L 27/115**,
21/8247

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(21) International Application Number:
PCT/IB2003/004949

(81) Designated States (*national*): AE, AG, AL, AM, AT, AU,
AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU,
CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE,
GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR,
KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK,
MN, MW, MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT,
RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR,
TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(22) International Filing Date: 31 October 2003 (31.10.2003)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
02080070.2 6 December 2002 (06.12.2002) EP

(84) Designated States (*regional*): ARIPO patent (GH, GM,
KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW),
Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),
European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE,
ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO,
SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM,
GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

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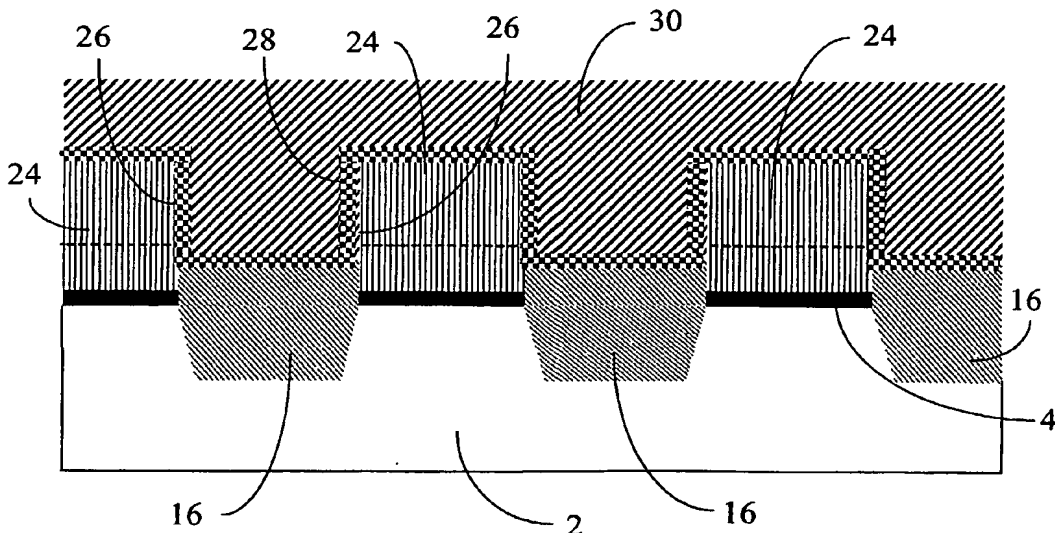
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Declaration under Rule 4.17:

— *as to applicant's entitlement to apply for and be granted
a patent (Rule 4.17(ii)) for the following designations AE,
AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH,*

[Continued on next page]

(54) Title: SHALLOW TRENCH ISOLATION IN FLOATING GATE DEVICES



(57) **Abstract:** The present invention provides a method for manufacturing a floating gate type semiconductor device on a substrate having a surface (2), and a device thus manufactured. The method comprises: - forming, on the substrate surface, a stack comprising an insulating film (4), a first layer of floating gate material (6) and a layer of sacrificial material (8), - forming at least one isolation zone (18) through the stack and into the substrate (2), the first layer of floating gate material (6) thereby having a top surface and side walls (26), - removing the sacrificial material (8), thus leaving a cavity (20) defined by the isolation zones (18) and the top surface of the first layer of floating gate material (6), and filling the cavity (20) with a second layer of floating gate material (22), the first layer of floating gate material (6) and the second layer of floating gate material (22) thus forming together a floating-gate (24).